

**IN THE UNITED STATES DISTRICT COURT
FOR THE NORTHERN DISTRICT OF ILLINOIS
EASTERN DIVISION**

Trading Technologies International, Inc.,)
Plaintiff,)
vs.) No. 04 C 5312
eSpeed, Inc., eSpeed International, Ltd.,) Judge Moran
Ecco LLC, and Ecco Ware Ltd.,)
Defendants.)

Trading Technologies International, Inc.,)
Plaintiff,)
vs.) No. 05 C 1079
Refco Group Ltd., LLC, et al.,) Judge Andersen
Defendants.)

Rosenthal Collins Group, LLC, Plaintiff-Counterclaim Defendant, vs. Trading Technologies International, Inc., Defendant-Counterclaimant,)	No. 05 C 4088
)	Judge Moran

Trading Technologies International, Inc.,)
Plaintiff,)
vs.)
GL Consultants, Inc. and GL Trade SA,)
Defendants.)
No. 05 C 4120
Judge Gottschall

Trading Technologies International, Inc.,)
Plaintiff,)
vs.) No. 05 C 4811
CQGT, LLC and CQG, Inc.,) Judge Moran
Defendants.)

Trading Technologies International, Inc.,)
Plaintiff,)
vs.) No. 05 C 5164
FuturePath Trading, LLC,) Judge Shadur
Defendant)

**All Cases Assigned to Judge
Moran For Common Issues**

MEMORANDUM OPINION AND ORDER

Plaintiff Trading Technologies International, Inc. ("TT") brought suit against eSpeed, Inc., ITSEcco Holdings Limited, Ecco LLC, and EccoWare Ltd. (collectively "eSpeed"), alleging infringement of U.S. Patent Nos. 6,766,304 ('304) and 6,882,132 ('132). Both parties have filed a number of summary judgment motions in an attempt to limit the scope of the trial.

Today we deal with the parties' cross-motions for partial summary judgment with respect to eSpeed's invalidity defense of prior public use. Connected to the motions before us today is our determination regarding the parties' cross-motions for summary judgment as to the priority date for the '132 and '304 patents, decided on July 12, 2007. Trading Technologies Int'l, Inc. v. eSpeed Inc., No. 04-5312 (N.D.Ill. July 12, 2007) ("priority date determination"). For the reasons stated herein, we grant in part TT's motion for partial summary judgment and deny eSpeed's cross-motion for the same.

BACKGROUND¹

TT filed U.S. Patent Application No. 60/186,322 ('322 provisional application) on March 2, 2000. On June 9, 2000, TT filed U.S. Patent Application No. 09/590,692 ('692 application), which claimed priority to the '322 provisional application. TT then filed U.S. Patent Application No. 09/894,637 ('637 application) on June 27, 2001, which claimed priority to the '692 and '322 provisional applications. The '692 application issued as the '132 patent on July 20, 2004 and the '637 application issued as the '304 patent on July 20, 2004. TT argues that both the '132 and '304 patents are entitled to a priority date of March 2, 2000, which makes the critical date for both patents March 2, 1999. eSpeed disagrees, arguing that the patents-in-suit are entitled only to a priority date of June 9, 2000, making the critical date June 9, 1999.²

In September 1998, Harris Brumfield was involved in electronically trading Bund futures on the Eurex exchange. Prior to transitioning to use of the patented software at issue in this case – the date of which sits as the crux of the dispute underlying these motions –

¹We take the following facts from the statements submitted by the parties pursuant to Local Rule 56. Because many of the alleged "facts" are disputed, we address the undisputed facts herein and deal with the remaining contentions in the discussion section.

²While the priority date does come into play in the motions at hand, an in-depth discussion of that dispute can be found in the priority date determination.

Brumfield traded using TT's commercial X_Trader product. Brumfield was billed for licenses to TT's X_Trader product for at least the months of January through April 1999. At his office, Brumfield ran multiple computers connected to an RGB Spectrum box, which allowed for the video output of multiple computers and other video feeds to be input into and displayed on a single computer screen – generally Brumfield's 50-inch plasma screen. A video recorder was connected to Brumfield's system to record the display of his 50-inch plasma monitor, on which Brumfield regularly recorded the activity shown on his monitor. Andrew Moak Griffin managed Brumfield's office from September 1998 through December 1999, and his duties included logging Brumfield onto various systems each morning.

In September 1998, Brumfield met with Gary Kemp, TT's CEO, to discuss the possibility of engaging TT in a consulting project to develop a trading tool based on his idea for a new tool for electronic trading. The confidential conversation led to a consulting contract with TT executed on September 29, 1998. At all times the consulting work was maintained as confidential, and remained under Brumfield's control and direction. In October 1998, Simon Tam began working to provide the programming services required to turn Brumfield's idea into a workable trading tool. According to his testimony, Tam continued to work as a consultant to Brumfield through the summer of 1999.³

In late 1998, unsatisfied with the progress on the project, Brumfield requested that Farley Owens provide daily supervision to the project and Tam. Throughout development, Tam and Owens ran compiled versions of the development software for the purpose of testing its functionality, running the software in both simulated and live markets for test purposes in

³Although eSpeed recognizes Tam's testimony that he continued to work for Brumfield as an independent contractor after February 1999, eSpeed disputes the truth of such a contention, pointing to Tam's new job that commenced on February 16, 1999 and Tam's lack of any records, time sheets, billing statements, or tax returns supporting his contention.

order to determine whether the software was properly displaying the working order. Although Tam usually cancelled the orders placed on a live market before they could get filled, in January 1999, Tam forgot to cancel one order. The order was filled and money was lost.

In January 1999, because Owens did not have access to a live market at TT's Evanston office, a development computer was installed in Brumfield's office. There, Owens could conveniently work on the project, run the development software connected to a live market, and update Brumfield on its status. Remote access software was installed on the development computer to allow Tam and Owens to access and install versions of the software from TT's Evanston office. In February 1999, a faster Kryotech computer replaced the development computer in Brumfield's office. The development computer was connected to the RGB Spectrum box and could be displayed on the 50-inch plasma computer monitor. TT asserts that the development computers were dedicated to use by Owens and not used for trading, a contention contested by eSpeed.

Both parties have filed a significant amount of evidence and testimony tending to support their positions, including testimony from a number of depositions. The deposition testimony attests to the deponent's memory regarding his or her input of test and non-test orders, dates of the input of such orders, and a number of other affirmations recalled by deponents. Thus, in addition to the fact section set forth herein, the parties have included a significant number of additional "fact" statements that are truly argumentative and remain contested. Therefore, we address the remainder of the parties' contentions in the analysis section below.

DISCUSSION

Summary judgment is proper "if the pleadings, depositions, answers to interrogatories,

and admissions on file, together with the affidavits, if any, show that there is no genuine issue as to any material fact" such that the moving party is entitled to judgment as a matter of law. FED.R.CIV.P. 56(c). For purposes of summary judgment, we construe the facts in favor of the non-movant (Adickes v. S.H. Kress & Co., 398 U.S. 144, 157 (1970)) and draw all inferences and view underlying facts in the light most favorable to the non-moving party. U.S. v. Diebold, Inc., 369 U.S. 654, 655 (1962). The mere existence of some factual dispute will not frustrate an otherwise proper summary judgment; only a genuine dispute over a material fact will defeat summary judgment. Anderson v. Liberty Lobby, Inc., 477 U.S. 242, 247-48 (1986).

A patent enjoys a presumption of validity. 35 U.S.C. § 282. Such a presumption can be overcome only by establishing facts supported by clear and convincing evidence. SRAM Corp. v. AD-II Engineering, Inc., 465 F.3d 1351, 1357 (Fed.Cir.2006) (citing U.S. Surgical Corp. v. Ethicon, Inc., 103 F.3d 1554, 1563 (Fed.Cir.1997)). eSpeed has asserted prior public use of plaintiff's patented invention under 35 U.S.C. § 102(b), which, if proven, may operate to invalidate the patents-in-suit. eSpeed has the burden of proving prior public use by clear and convincing evidence (Allied Colloids Inc. v. American Cyanamid Co., 64 F.3d 1570, 1575 (Fed.Cir.1995)), and the burden never shifts to TT. Sinskey v. Pharmacia Ophthalmics, Inc., 982 F.2d 494, 498 (Fed.Cir.1992), *abrogated in part on other grounds*, Pfaff v. Wells Elecs., 525 U.S. 55, 67-68 (1998). In order for TT to succeed on its motion for summary judgment, we must find that, taking the facts in the light most favorable to eSpeed, a reasonable jury could not find prior public use by clear and convincing evidence. In order for eSpeed to succeed on its cross-motion, we must find that, taking the facts in the light most favorable to TT, no reasonable jury could disagree that eSpeed has established a barring prior public use under § 102(b) by clear and convincing evidence.

The patent laws state that “[a] person shall be entitled to a patent unless — (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of the application for patent in the United States.” 35 U.S.C. § 102(b). Section 102(b) includes both an “on sale” and “public use” bar, established to prohibit the inventor from removing existing knowledge from public use, prohibit an extension of the period for exploiting the invention, and favoring prompt and widespread disclosure of inventions. *See Motionless Keyboard Co. v. Microsoft Corp.*, 486 F.3d 1376, 1384 (Fed.Cir.2007); *Manville Sales Corp. v. Paramount Systems, Inc.*, 917 F.2d 544, 550 (Fed.Cir.1990).⁴ In assessing a public use claim, we consider “whether the purported use: (1) was accessible to the public; or (2) was commercially exploited.” *Invitrogen*, 424 F.3d at 1380. Whether an invention was in public use within the meaning of § 102(b) is a question of law based on underlying facts. *Manville Sales Corp.*, 917 F.2d at 549.

To invalidate a patent, any public use must occur prior to the patent’s critical date. In this case there is a dispute about the critical date of the patents-in-suit. Because a patent is entitled to claim priority to the date of a provisional or parent application, so long as the earlier filed application satisfies all the requirements of 35 U.S.C. § 112 (35 U.S.C. § 120, *Go Medical Industries Pty., Ltd. v. Inmed Corp.*, 471 F.3d 1264, 1270 (Fed.Cir.2000)), TT contends that the critical date for both patents-in-suit is March 2, 1999. eSpeed disagrees, arguing that the provisional application filed on March 2, 2000, fails to satisfy the written description

⁴TT argues that the Federal Circuit’s recent decision in *Invitrogen Corp. v. Biocrest Manufacturing, L.P.*, 424 F.3d 1374 (Fed.Cir.2005), rejected the previously used “totality of the circumstances” test for assessing a prior public use claim that focused its attention on the policies underlying the public use bar. While it is clear that *Invitrogen* did reject the “totality of the circumstances” test, preferring a two-part test, the Federal Circuit, since *Invitrogen*, has continued to look to the policies underlying the public use bar to provide context for the assessment. *See e.g., Motionless Keyboard Co.*, 486 F.3d at 1384; *Eli Lilly and Co. v. Zenith Goldline Pharmaceuticals, Inc.*, 471 F.3d 1369, 1380 (Fed.Cir.2006).

requirement of § 112, and therefore, the critical date is one year prior to the filing of the parent application, or June 9, 1999. We have already determined that the priority date presents a question of fact to be determined by a jury, and therefore, we address the outcome of the motions at hand upon a finding of a March 2, 1999, critical date, and a June 9, 1999, critical date. TT contends that, regardless of the critical date, it is entitled to summary judgment. eSpeed contends that there is a genuine issue of material dispute as to public use prior to March 2, 1999, and that it is entitled to summary judgment should the jury determine that the critical date is June 9, 1999.

eSpeed relies on two events to argue its entitlement to summary judgment or defeat of TT's motion for the same. First, defendants assert that use of the development software undertaken by Tam and Owens constitutes public use under § 102(b). Second, defendants assert that use of the software undertaken by Brumfield constitutes public use sufficient to establish invalidity. We address each individually and discuss the evidence submitted and actions taken prior to March 2, 1999, and June 9, 1999.

Although it is undisputed that the activity taken with regard to the software at issue was kept confidential and under the direction and control of Brumfield prior to March 2, 1999, commercial use is considered a public use under § 102(b), even if it was kept secret. Kinzenbaw v. Deere & Co., 741 F.2d 383, 390 (Fed.Cir.1984).⁵ And, even “a single instance of competitive exploitation of the invention...prior to the critical date can raise...the...‘in public use’ bar[] to patentability.” Martin v. Norman Industries, Inc., 725 F.2d 990, 993 (Fed.Cir.1984) (internal citations omitted). Where, however, public use is undertaken as experimentation to test the

⁵In Invitrogen, the Federal Circuit noted that this language from Kinzenbaw was, in fact, *dicta*. 424 F.3d at 1382, n*. The Invitrogen court went on to note that “[a] careful reading nonetheless shows that Kinzenbaw is consistent with the basic principle that a confidential use is not public under § 102(b) unless there is commercial exploitation.” *Id.*

invention, the Federal Circuit has created an exception. It has consistently and repeatedly held that experimental use of an invention can operate to negate application of the on sale or public use bars of § 102(b). *See Honeywell Int'l Inc. v. Universal Avionics Systems Corp.*, 488 F.3d 982, 997 (Fed.Cir.2007); *Eli Lilly and Co.*, 471 F.3d at 1381; *EZ Dock, Inc. v. Schafer Systems, Inc.*, 276 F.3d 1347, 1351 (Fed.Cir.2002); *Allied Colloids Inc.*, 64 F.3d at 1574. The Federal Circuit, following guidance from the Supreme Court in *Pfaff*, 525 U.S. 55, has recognized that experimental use, even if undertaken in public, may operate to negate a § 102(b) bar so long as the experimental use is ““a bona fide effort to bring [the] invention to perfection, or to ascertain whether it will answer the purpose intended.”” *Honeywell Int'l Inc.*, 488 F.3d 982, at 998 (citing *City of Elizabeth v. American Nicholson Pavement Co.*, 97 U.S. 126, 137 (1877)).

TT seeks to invoke the experimental use exception to the prior public use bar. Plaintiff asserts that the testing activity undertaken by Tam and Owens was experimental and thus negates the public use bar of § 102(b). eSpeed disputes such a contention, asserting that “testimony by Owens, Tam, and others makes clear that this pre-March 2, 1999, public use was routine bug fixing – not experimentation to determine if the purported invention would work for its intended purpose, which is what is actually necessary for TT to invoke the experimental use exception.” (eSpeed response, at 2).

As we have already noted, the burden of proof never shifts to a patent-holder to prove validity of its patent. *Sinskey*, 982 F.2d at 498. TT, however, does have an obligation to present evidence of experimental use. *Id.*, 982 F.2d at 498; *Mistop, Inc. v. Aerofin Corp.*, 298 F.Supp.2d 224, 229-30 (D.Conn.2003). We turn now to the submitted evidence.

Defendants contend that Tam and Owens used the software to place orders on live public markets prior to March 2, 1999. Such a contention is undisputed. Owens testified that

he ran the software in both simulated and production (live) environments prior to March 2, 1999 (TT exh. 11, at pp 220-221), which included placing orders in the live market on Mr. Brumfield's account (*id.*, at 222). Although the orders Owens placed were "real orders in real markets with real money" (*id.*, at 270), Owens could not recall how many orders were placed in the live market and whether any were filled (*id.*, at 222). Tam also recalled placing real orders in a live market prior to March 2, 1999 (TT exh. 8, at 188). He testified that he generally placed orders beyond the market and then cancelled the orders so that the trades were never filled (*id.*, at 190). In one instance, however, Tam forgot that he had placed a trade and forgot to cancel that trade, and the trade was filled and money was lost (*id.*, at 190-91).

TT contends that Owens' and Tam's placement of orders in live markets was experimental in nature. Testimony by both men supports TT's arguments. Owens testified that he placed orders in simulated and production environments in order to test the system – to "verify that the orders went into the market" and that the order book functionality and display were accurate (TT's exh. 11, at 221). Tam reported similar motives for placing trades in a production environment (TT exh. 8, at 187). Tam specifically stated, "I wasn't placing trades. I was putting orders in to see if it paints the working order properly" (*id.*, at 190).

TT further contends that as of March 2, 1999, the software was unusable due to a variety of flaws, bugs, and crashes. Both Owens' and Tam's testimony support such an assertion. For example, Tam reported that there were "intermittent bugs," "repaint problems," and "a fundamental flaw in the static price display methodology" (TT exh. 8, at 193). *See also id.*, at 275 (testimony that the software was still crashing in early March). Owens declared that as of early March, 1999, "there were critical issues with the software...[that] included crashes and the incorrect display of market data" (TT exh. 7, at ¶ 5). *See also* TT exh. 11, at 81-82 (Owens'

testimony of the critical issues with the software in March 1999).⁶

In an effort to create a genuine issue of material fact, defendants focus on creating a dispute as to whether the invention was reduced to practice prior to March 2, 1999. Once an invention has been reduced to practice, further testing will not qualify as experimental use for purposes of negating a bar under § 102(b). Continental Plastic Containers v. Owens Brockway Plastic Prods., 141 F.3d 1073, 1079 (Fed.Cir.1998). *See also New Railhead Mfg., L.L.C. v. Vermeer Mfg. Co.*, 298 F.3d 1290, 1299 (Fed.Cir.2002). In support of its argument that Brumfield's invention was reduced to practice prior to March 2, 1999, defendants point to Tam's February 22, 1999 departure for another job, Brumfield's agreement to pay for the consulting services on March 2, 1999, and videos showing the software running prior to March 2, 1999.

While eSpeed correctly states that reduction to practice does not require that the invention work perfectly (*see Scott v. Finney*, 34 F.3d 1058, 1062 (Fed.Cir.1994) (commenting in an interference proceeding that “[t]esting need not show utility beyond a possibility of failure, but only utility beyond a probability of failure”)); Harrington Mfg. Co., Inc. v. Powell Mfg. Co., 815 F.2d 1478, 1481 (Fed.Cir.1986) (“There is no requirement that an invention

⁶eSpeed argues that Tam started his new job at TradeLink, full-time, on February 22, 1999. In support, eSpeed entered testimony of Jay Twery, an employee of TradeLink and the person who had hired Simon Tam, suggesting that Tam had intended to start work on February 16, 1999, took off an additional week to work for Brumfield, and then came to work full-time at TradeLink on February 22, 1999. (eSpeed, Exh. E, at 44-46). Because Owens based, in part, his understanding of the critical issues of the software on Tam's departure date, eSpeed implies that Owens's testimony is to be disbelieved. Twery, however, also testified that he based his knowledge of Tam's start date on payroll documents, and did not personally recall when Tam actually began working at TradeLink (TT exh. 22, at ¶ 5). Although later testimony repudiating earlier deposition testimony is generally stricken, where, as here, Twery explained the contradiction, we may accept his testimony. *See Sinskey*, 982 F.2d at 498 (Fed.Cir.1992). Further, defendants have failed to set forth any facts that would cause us to disbelieve Owens in his recollection of when the software became usable. Cf. TypeRight Keyboard Corp. v. Microsoft Corp., 374 F.3d 1151, 1158 (Fed.Cir.2004) (“Summary judgment should not be denied simply because the opposing party asserts that the movants witnesses are not to be believed. However, summary judgment is not appropriate where the opposing party offers specific facts that call into question the credibility of the movants witnesses”).

function perfectly in order to be reduced to practice or considered as on sale or in public use"), eSpeed has failed to provide any concrete evidence that the inventor was convinced that the invention was capable of performing its intended purpose in its intended environment. *See EZ Dock, Inc.*, 276 F.3d at 1352; *Seal-Flex, Inc. v. Athletic Track and Court Construction*, 98 F.3d 1318, 1322 (Fed.Cir.1996) ("the issue is not how much development had already been done, but whether the invention was in fact complete and was known to work for its intended purpose"). In fact, its submitted evidence points to a contrary finding. Testimony from Tam, Owens, Brumfield and Kemp suggests that Brumfield was unwilling to pay his consulting fees until he was satisfied with the project. He paid his fees on March 2, 1999. It is impossible to tell from the short pre-March 2, 1999, video clips as to whether the invention suffered from critical flaws. Nor do the pages of cited testimony from Brumfield's deposition establish that the software was running without critical flaws. TT, on the other hand, has submitted evidence that software displayed in the videos, including the March 15, 1999 extended video, is replete with flaws, making it unusable for trading. *See* TT exh. 32 (declaration of Owens, June 18, 2007, pointing out the various errors from screen shots of the videos). Owens asserted that "[M]y observation of the videos makes clear that the software was so deficient that it could not have been used primarily for the purpose of making money" (*id.*, at ¶ 4). Finally, we have addressed Tam's TradeLink start date in a footnote above, and cannot find that the evidence submitted regarding Tam's transition from TT to TradeLink offers any substantial evidence that the invention was reduced to practice prior to March 2, 1999. Based on eSpeed's failure to provide any substantial evidence to the contrary, we are convinced that no reasonable jury could find that Tam and Owens were engaging in premature commercial exploitation of the invention.

Although the "totality of the circumstances" test has fallen by the wayside (see

Invitrogen, 424 F.3d 1374), the test for the public use prong also bolsters our finding. The Federal Circuit has weighed such factors as the nature of the activity that occurred in public; the public access to and knowledge of the public use; whether there was any confidentiality obligation imposed on persons who observed the use; whether progress records or other indicia of experimental activity were kept; whether persons other than the inventor or acting for the inventor conducted the experiments; how many tests were conducted; the scale of the tests compared with commercial conditions; the length of the test period in comparison with tests of similar products; and whether payment was made for the product of the tests in order to assess experimental use, even in the wake of Invitrogen. *See Eli Lilly and Co.*, 471 F.3d at 1381; Invitrogen Corp., 424 F.3d at 1380. There is no dispute that Owens and Tam, along with everyone else involved in the project, were under strict confidentiality obligations. The public was unaware of any public use, as it would have been impossible to tell through what platform Tam and Owens were placing orders in the market. The software was neither offered for sale nor marketed. *But see Martin*, 725 F.2d 990 (public demonstration of machine and partial performance of contract using machine constituted prior public use). All trading activity undertaken with the software occurred in a private office, either TT's Evanston office or Brumfield's downtown office. Only the inventor, his personal employee and a hired consultant, worked with the software. It is unclear whether formal records were kept, but Owens and Tam testified that they would regularly report to Brumfield regarding the progress of the software development.

Plaintiff's invention was designed to "ensure fast and accurate execution of trades by displaying market depth on a vertical or horizontal plane, which fluctuates logically up or down, left or right across the plane as the market price fluctuates" (TT exhs. 1 and 2). Until

the product was tested in a live market, the inventor could not be sure of the “workability of the invention in the context of the problem it solved.” Scott, 34 F.3d at 1062. Based on these indicia, and recognizing eSpeed’s inability to garner any concrete facts proving otherwise, we find that any trading activity undertaken by Tam or Owens prior to March 2, 1999, was experimental in nature and therefore negates the public use bar of § 102(b).⁷

We turn now to eSpeed’s contention that Brumfield’s actions constitute public use under § 102(b). With regard to trading activity prior to March 2, 1999, eSpeed contends that there is a genuine issue of material fact as to whether Brumfield engaged in public use of the software invention. If the fact-finder determines that the critical date for the patents-in-suit is June 9, 1999, however, eSpeed contends that they should be granted summary judgment of invalidity, as Brumfield engaged in invalidating prior public use under § 102(b) during that time.

TT contends that the Federal Circuit’s decision in Invitrogen Corp., 424 F.3d 1374, makes it clear that Brumfield’s action, even if he was trading on a live exchange using the inventive software, was not a public use under § 102(b). In Invitrogen, the patent at issue claimed a process of introducing recombinant DNA molecules into receptive *E. coli* cells to improve the cells’ “competence.” The undisputed evidence established that Invitrogen used the claimed process before the critical date, in its own laboratories, to produce competent cells – Invitrogen did not sell the claimed process or any products made using the claimed process. It kept use of the claimed process confidential, known only within the company. The district court found a public use under § 102(b) because Invitrogen had used the claimed process in its laboratories to “further other projects.” The court deemed such use commercial exploitation.

⁷Because defendants do not argue that either Tam or Owens traded for commercial gain between March 2, 1999, and June 9, 1999, outside of the testing/trading already discussed, we need not address whether a June 9, 1999, critical date would alter our conclusion with respect to Owens and Tam.

The Federal Circuit reversed, noting that “there is no evidence that Invitrogen received compensation for internally, and secretly, exploiting its cells. The fact that Invitrogen secretly used the cells internally to develop future products that were never sold, without more, is insufficient to create a public use bar to patentability.” Invitrogen Corp., 424 F.3d at 1382-83.

TT argues that Invitrogen is controlling here:

eSpeed points only to alleged use of the software by the [sic] Mr. Brumfield to place orders on actual markets. The claims of the patents-in-suit relate to a tool for placing trade orders. Some of the claims are method claims and some are system/software claims. The method claims do not describe a process for making a product that can then be sold (unlike the classic secret public use cases in which a patented method is used in a factory to make widgets that are then sold). To the extent that Mr. Brumfield was entering orders on live markets, the only thing commercial occurring was the buying and selling of standard German government bonds – not a product of the patented method. These bonds could be bought and sold irrespective of the particular trading tool being used to place orders. As a matter of law, this cannot be a commercial exploitation of the patented software under Invitrogen.

(TT’s reply, at 3). eSpeed disputes the applicability of Invitrogen, arguing that “a rule requiring that an inventive method be placed ‘on sale’ would render the ‘public use’ prong of § 102(b) meaningless, and would permit inventive methods to be used for commercial gain in secret for years and still be eligible for patent protection whenever the inventor decided it was time to share it with the public, an outcome antithetical to the public policy of offering a limited term of exclusivity in exchange for prompt disclosure.”

We find eSpeed’s argument regarding Invitrogen persuasive. In Invitrogen, although plaintiff used its claimed process to further other projects, it never commercialized the later patented process until after the critical date. Further, it did not use its claimed process to make money since it never sold any later product developed using the process. Such is not the allegation here. In this case, eSpeed contends that Brumfield used his inventive software for personal commercial gain prior to the critical date. If Brumfield did in fact use the software

to trade and make money, such action, in our determination, falls within the ambit of public use under § 102(b). Invitrogen itself recognizes that § 102(b), in contrast to § 102(a), can apply to the inventor's own actions. 424 F.3d at 1381. And while private use of one's own invention is permissible (Bergstrom v. Sears, Roebuck and Co., 457 F.Supp. 213, 224 (D.Minn.1978)), an inventor's own commercial use, even if kept secret, may constitute public use under § 102(b). Woodland Trust v. Flowertree Nursery, Inc., 148 F.3d 1368, 1370 (Fed.Cir.1998); Kinzebaw, 741 F.2d at 390. If defendants succeed in proving that Brumfield used his invention to trade for profit – to garner a competitive advantage in the marketplace – such is a barring public use different from the use discussed in Invitrogen. Further, because Brumfield's invention need not have been disclosed to the public in order to be commercially exploited, Brumfield's exclusively private use of the invention would not abrogate the public use bar. *See Mistop, Inc.*, 298 F.Supp.2d at 229. Therefore, we turn to the evidence to determine whether either party has established, as a matter of law, that Brumfield did or did not engage in trades that commercially exploited his invention prior to the critical date.

We begin with the evidence submitted regarding Brumfield's alleged trading with the software prior to March 2, 1999. While eSpeed does not contend that they should be granted summary judgment on the matter, they do argue that there is a genuine issue of material fact as to whether Brumfield commercially exploited the software prior to March 2, 1999. We disagree. Brumfield testified that he did not trade with the development software prior to March 3, 1999. His deposition testimony was consistent and clear. *See, e.g.*, TT exh. 4, at 95 (“All I know is I told him a hundred percent unequivocally, no matter what, that I didn’t trade before March 3rd with the software”); *Id.*, at 96 (“And somehow, some way I knew a hundred percent for sure that I did not trade – trade with the software before March 3rd, 1999”).

Although Brumfield testified that he was unsure whether he placed a test order prior to March 3, 1999, he defined "trading" as activity "[f]or the purpose of making money." (TT's exh. 4, at 98). We read Brumfield's testimony to unequivocally state that he did not commercially exploit his product prior to March 3, 1999. Testimony from Owens, Griffin, Tam, and Schluetter either supports Brumfield's testimony or indicates a lack of knowledge. Owens testified that he "believe[d] that Mr. Brumfield did not use any versions of the software being developed under the consulting agreement to trade before March 3, 1999" (TT exh. 7, at ¶ 5), and that the software was not usable before that date (TT exh. 11, at p. 77). Griffin, the only person who set up Brumfield's trading screen and logged him into his trading software,⁸ testified that he never set up or logged Brumfield into the development software between September 1998 and the end of March 1999 (TT exh. 5 at ¶¶ 2,4). Griffin testified that he never saw Brumfield use the development software in any fashion prior to March 2, 1999 (TT exh. 5, at ¶ 8), and could not recall when Brumfield first used the development software to enter a trade after that date (exh. 6, at 112-13). Tam testified that he never saw Brumfield trade with the development software (TT exh. 8, at 176). Schluetter could not testify to Brumfield's use of the software to place test or trade orders (TT exh. 14, at 142). Further evidence supports Brumfield's contention that he did not use the software for moneymaking trades prior to March 2, 1999. Brumfield refused to pay for TT's consulting services prior to March 2, 1999. The technology was transferred to Brumfield on March 4, 1999 (TT exh. 3, at 193). Brumfield testified that he had spikes in his profit-and-loss figures in early March and summer of 1999 that could be consistent with his transition from using X_Trader software to the claimed software.

⁸Brumfield did not himself know how to use the RGB Spectrum device to cause the development software to appear on his trading screen (TT exh 6, at 203).

eSpeed relies on the following evidence to show that Brumfield may have commercially exploited the software prior to March 2, 1999: (1) videos showing the software running prior to March 2, 1999; (2) Kemp's testimony that the "likelihood is very good" that Brumfield used the software to trade with "real markets, real money" before March 2, 1999; (3) Brumfield's inability to produce any records or articulate how he arrived at the March 3, 1999 date; and (4) a lack of witnesses that can confirm Brumfield did not use the software prior to March 2, 1999.

The videos prior to March 2, 1999, to our understanding, do not show any trading activity, and therefore cannot create a genuine issue of material fact as to whether Brumfield prematurely commercially exploited his invention. We take a closer look at Kemp's testimony to determine whether it creates a genuine issue of material fact. We find that it does not. Kemp, in discussing Brumfield's access to the software during development, noted that Brumfield could "potentially" use the software "on a limited basis in production environment to see if what we had done to that point was right or met his needs or that he was happy with it and so on" (TT exh. 3, at 163). In response to Kemp's definition of "production environment," Kemp noted that in a production environment Brumfield would have been able to "potentially use the software with real markets, real orders, real markets, real money." (*Id.*). In our reading of the deposition testimony, because Kemp discussed Brumfield's ability to determine whether he was happy with the software "to that point," we read the testimony to be discussing testing in a live production environment, rather than commercial exploitation of the product. Kemp did go on to say that while he could not be 100 percent certain, he thought that "the likelihood is that" Brumfield used the software in production and simulation in January 1999 (*id.*, at 164). With regard to Brumfield's use of the software, Kemp stated that

Brumfield "had played with that and he put orders in," and was unhappy with the software (*id.*, at 165). Kemp based his belief that Brumfield had used the software in a production environment because Brumfield was "very, very specific about the fact that the market depth couldn't even keep up with the realtime production feed and that it actually fell apart" (*id.*). Such testimony supports TT's contention that the software had not yet been reduced to practice and any activity in a live market was for experimental purposes only. *See Baker Oil Tools, Inc. v. Geo Vann, Inc.*, 828 F.2d 1558, 1563 (Fed.Cir.1987) ("The law recognizes an inventor's need to test the invention, to ascertain whether the work is complete or further changes should be made, and to show that the invention will work for its intended purpose"). In fact, Kemp declared, with respect to conversations with Brumfield in early 1999, "I remember various commentary by other features on the product which demonstrated that it was too early, too immature, not done, full of bugs and so on" (*id.*, at 167). Kemp clearly responded that he did not know one way or the other whether, during December 1998 and January 1999, Brumfield was able to successfully send an order to market and get it executed (*id.*, at 180-81). As we decided earlier, testing, even in a live market, does not constitute public use, where, as here, there is no evidence that the invention had been reduced to practice. Therefore, Kemp's testimony fails to create a genuine issue of material fact.

Nor does eSpeed's implication that Brumfield's inability to remember how he determined the March 3, 1999, date create a genuine issue of material fact. eSpeed must produce factual evidence that contradicts plaintiff's contention that Brumfield did not commercially exploit his invention prior to the critical date. Pinning their hopes on the thought that the jury may disbelieve Brumfield (and his corroborating sources) is insufficient to create a factual dispute. *See Sattar v. Motorola, Inc.*, 138 F.3d 1164, 1171 (7th Cir.1998). Cf. *TypeRight*

Keyboard Corp., 374 F.3d at 1158 (finding that specific facts tended to discredit witness). This is true especially where, as here, the party opposing summary judgment has “failed to ‘shake’ the [plaintiff’s] version of the facts or to raise significant issues of credibility.” Corrugated Paper Products, Inc. v. Longview Fibre Co., 868 F.2d 908, 914 (7th Cir.1989).

Finally, eSpeed’s contention that TT has been unable to produce witnesses that can confirm that Brumfield did not use the software prior to March 2, 1999, fails to hold any water. TT’s witnesses cannot prove a negative; all they can do is swear under oath that they did not see Brumfield using the software to trade for commercial purposes prior to March 2, 1999. Such is exactly what TT’s witnesses stated. eSpeed has failed to evidence a genuine issue of material fact as to whether Brumfield commercially exploited his invention prior to March 2, 1999. Because we earlier held that the alleged activity by Tam and Owens was insufficient to create a genuine issue of material fact as to public use, we now grant summary judgment of no prior public use prior to March 2, 1999.

Because the parties dispute the critical date of the patents-in-suit, such a finding does not end the dispute. We must now determine whether eSpeed produced sufficient evidence that Brumfield’s actions between March 2, 1999 and June 9, 1999 constituted public use under § 102(b). eSpeed relies on the following evidence to argue that they are entitled to summary judgment of public use prior to June 9, 1999: (1) Brumfield’s statement that he was doing a combination of testing and trading within four to six weeks of March 3, 1999; (2) two e-mails from Tina Yarovsky, Gary Kemp’s executive assistant, indicating that TT changed the date that Brumfield started using MD Trader from March 25, 1999 to March 3, 1999; (3) Brumfield’s March 15, 1999, video, which eSpeed alleges shows user activity using the new software; and (4) a general positive trend in Brumfield’s surviving trading records in March 1999. TT

disputes the characterization and import of eSpeed's evidence, and, citing SRAM Corp., 465 F.3d at 1357, argues that eSpeed cannot meet its clear and convincing burden by speculating on whether Brumfield traded for commercial purposes prior to June 9, 1999.

We begin with Brumfield's deposition testimony. In discussing whether he submitted test orders and when he began trading using the new software, Brumfield stated: "I can say for sure I was doing a combination. Within – within four to six weeks of March 3rd, '99, I can say that I'm reasonably certain that I was doing a combination of trading and testing," (eSpeed exh. B., at 182-83). Brumfield, in an earlier conversation discussing his definition of "trading," stated that he was using the word "trading" as "[f]or the purpose of making money" (*id.*, at 98). Therefore, eSpeed argues, Brumfield acknowledged that he was using the inventive software for the purpose of making money – commercial exploitation – prior to June 9, 1999. TT responds:

eSpeed argues that Mr. Brumfield's "testing and trading" testimony should be read as simply "trading," without any acknowledgment of "testing." This reading is incongruous, as testing necessarily precedes trading in this context, and, at some point, the testing would need to include use with real money in live markets.

(TT surreply, at 2). While we recognize that TT's argument is a stretch, because eSpeed must meet such a high burden – clear and convincing evidence – in order to prevail on summary judgment, we find that Brumfield's commercial use of the inventive product between March 2, 1999, and June 9, 1999, is a question for the jury.

We are not dissuaded by eSpeed's remaining evidence. The deposition testimony regarding e-mails from Tina Yarovsky to Brumfield, viewed alongside the e-mails themselves, does not establish as a matter of law that Brumfield began trading with MD Trader or the

inventive software on March 3, 1999, or March 25, 1999.⁹ Yarovsky's deposition testimony cannot establish the truth of when Brumfield began trading with MD Trader because Yarovsky had no personal knowledge of such a fact. Nor is her testimony that Kemp told her to write the e-mail admissible. *See Eisenstadt v. Centel Corp.*, 113 F.3d 738, 742 (7th Cir.1997) ("hearsay is inadmissible in summary judgment proceedings to the same extent that it is inadmissible in a trial"). Therefore, Yarovsky's deposition testimony establishes only that she sent the e-mails. The e-mails themselves do not establish as a matter of law that Brumfield began trading for commercial purposes in March 1999. The relevant portion of the first e-mail reads: "For patent purposes, we have added a couple of clauses to section 3, indicating that you began using MD Trader on 25-Mar-99" (TT exh.20). The second e-mail notes: "We have made one final revision – indicating that you began using MD Trader on 03-Mar-99 (instead of 25-Mar-99, as listed below)." (*Id.*). Because of the introductory clause "[f]or patent purposes," it is distinctly possible that such a date was chosen as a conservative date to preserve TT's rights under the patent laws. It does not necessarily establish that Brumfield began trading on that date, just that TT was confident that he did not begin trading before that date. In fact, such a reading is consistent with deposition testimony of Kemp and Brumfield articulating that they chose the most conservative date on which to base their filing of the provisional patent application. *See* TT exh. 3, at 198-99 (Kemp testified: "When we started the process of putting together the provisional patent for the predecessor effectively of these two patents, which I believe was filed on March 2nd, 2000, and when we began the process of putting that provisional patent together, one of the things that I was very focused on was trying to determine a date to make

⁹We note that Brumfield testified that the name "MD Trader" did not refer to his inventive software, although he was unaware of whether anyone at TT used that name to describe his software (TT exh. 27, at 276).

sure we could not in any way be outside the one year rule for patents..."); TT exh. 4, at 102-03 (Brumfield testified: "All I know for a hundred percent fact is when I talked to Gary Kemp in early 2000 is we came up with a date, and I told him a date.... That date, no matter what, I did not trade before that date.... I think we were probably very conservative in our date.").

Nor does the March 15, 1999, video establish as a matter of law that Brumfield was commercially exploiting his invention on that date. While it is clear that the video shows user activity on the grid displayed on the upper left corner of the user's screen (the mouse moves and clicks), it is impossible to know whether the movement is testing or trading for commercial gain. Further, Owens' declaration sets forth a significant number of problems with the software evident in that video (TT exh. 35). Because we have already established that testing in a live market does not necessarily constitute public use under § 102(b), we cannot find as a matter of law that the video establishes that Brumfield was commercially exploiting his invention on March 15, 1999.

Finally, eSpeed points to the spike in Brumfield's trading records. Brumfield testified that "the minute I started trading with MD Trader, the trajectory of my trading went up and never came close to tracing back to that original point..." (eSpeed, exh. G, at 577). He noted that March 3, 1999, stood out to him as a potential date, based on his trading records, when he might have started using MD Trader (*id.*, at 577-79). While Brumfield conceded that his trading records were "very supportive" of the March 3, 1999, date, he also commented that there are "literally tons of possibilities" (*id.*, at 580). For example, in a later deposition Brumfield suggested that there were "several times [in] June, July, August" that showed an upward profits trend. TT argues that Brumfield's deposition testimony described above, and his consistent statements that he was unsure exactly how or why he originally came up with the

March 3, 1999, date, establish that there is a question of fact as to when Brumfield began trading commercially with the software.

Based on our analysis above, and recognizing, as we previously did, that TT submitted significant evidence establishing flaws in the software through March 1999, and into the summer of 1999, we deny both parties' motions for summary judgment as to prior public use between March 2, 1999, and June 9, 1999. eSpeed may well have the better of the argument respecting public use prior to June 9, 1999, but probabilities are not enough for summary judgment.

CONCLUSION

For the reasons stated herein, we grant TT's motion for summary judgment with regard to prior use before March 2, 1999. We deny the remainder of TT's motion for summary judgment and deny eSpeed's motion for summary judgment on prior use.



JAMES B. MORAN
Senior Judge, U. S. District Court

Aug. 16, 2007.